

SURVEY OF SOUTH INDIAN PELICANRIES¹

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A survey was undertaken as part of a doctoral programme to assess the grey pelican (*Pelecanus philippensis* Gmelin, 1789) population and its distribution in the Indian sub-continent. As a first step we concentrated on known pelicanries in South India. Since the abandonment of the famous Kolleru Pelicanry (Neelakantan, 1946), Gee (1960), Guttikar (1974) and personal observation in 1980, a survey has become necessary to locate and census existing birds.

Keeping Nelapattu (Nagulu *et al.*, 1980), Nagulu & Ramana Rao (1981), as a field station for continuous study of the 'Breeding and Feeding Biology of grey pelican or the spottedbilled pelican (*Pelecanus philippensis*), we visited the known Pelicanries during the breeding season on the dates mentioned against each

<i>Location</i>	<i>Date visited</i>
Vedanthangal Bird Sanctuary, Chengalpattu District, Tamil Nadu	12.12.1981
Telineelapuram, Srikakulam District, Andhra Pradesh	24.1.1982
Kokkare Bellur & Bannalli, Mandya District, Karnataka	4.7.1982
Kundakolam & Moondraidapu (not visited)	Personal communication with the village head 17.12.1981

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Vedanthangal:

The grey pelican is an occasional visitor but not as a breeding bird to this ancient bird sanctuary. Grey Pelicans come here in flocks of 5-10 spend some time and depart (according to Forest Guard). We did not see any during our visit.

Telineelapuram:

A small hamlet of 40 to 60 houses in Srikakulam District, Andhra Pradesh, close to Tekkali off a by-pass road to Naupada on the east-coast. The village has Tamarind, Neem, Acacia and Prosopis trees. Of these, the tamarind and Neem are used by grey pelicans and painted storks (*Ibis leucocephalus*).

Though the Forest Department notified this pelicanry only in 1978, according to local people the pelicanry has been traditionally protected.

This village has a small tank which is practically dry and cannot store sufficient water as its bund is breached at more than one place.

During our visit we recorded 65 nests of pelicans on the 3 tall tamarind trees and in all about 65 young. The pelican population is around 200-250 birds including young. The young were in the age group of 30 to 45 days. As it was 11.00 in the morning the adult birds were returning from feeding. Pelicans regularly nest here during the months of October/November, every year without fail irrespective of climatic conditions. The Vamshadhara river, its estuary and Naupada swamp are the source of food.

The painted storks nested on 3 neem and 1 tamarind tree opposite to the pelicanry. About

500-600 painted storks were counted. The young were in the age group of 30-45 days. The pelicans and painted storks visit about the same time (October/November). However, the arrival date requires personal confirmation as the painted storks arrive two months later than the pelicans in other places like Bellur, Karnataka, Edurupattu, Andhra Pradesh.

Kundakolam & Moondraidapu:

At the extreme south of Tirunelveli District, Kundakolam is a small interior village with 200-300 houses spread over 1 sq km in area. It has a very old Pelicanry first reported by C. E. Rheinus (1906). Since then it has been attracting grey pelican and painted storks every season but unfortunately this year the birds had not come for want of water as most of the tanks were dry due to paucity of rains (personal communication from village head and also news item in Hindu daily, Sunday Magazine, May 23, 1982).

In the same weekly edition, it was reported that the grey pelicans and painted storks have shifted to new refuge in Ariyakulam of Tirunelveli District.

Moondraidapu, a small village on national Highway No. 7, 20 km from Tirunelveli on the road to Nagercoil has 2 large tamarind trees which accommodates painted storks and grey pelicans every year but this year grey pelicans came and left without nesting while the few painted storks stayed throughout to rear their young. Here the colony has been established for the last 17 or 18 years. It is the youngest Pelicanry of those listed above.

In the new refuge at Ariyakulam the pelicans nest on a Banyan tree (*Ficus bengalensis*) and an "illuppai" tree (*Bassia latifolia*). The Tirunelveli District has several tanks and reservoirs, which satisfy the needs of the birds.

Kokkare Bellur & Bannalli:

These two adjoining villages in Mandya District, located 12 km from Rudrakshapuram on the Halgur Road, between Bangalore and Mysore is one of the oldest Pelicanries in India. It is probably the place visited by Jerdon (1864) a century ago, when he was told that the Pelicanry had been in existence for ages. Only recently Neginhal (1976) drew attention to it again. The villagers fear that the birds will get disturbed and may desert their village if undue disturbance follows publicity.

The village receives its name Kokkare as a prefix to Bellur because of the presence of the birds (Kokkare = Heron). Recently, we made a visit to the Pelicanry on hearing that the pelicans came there in the month of January/February for breeding. Unfortunately the pelicans were not sighted but we confirmed the arrival and departure timings of the pelicans. Though the pelicans were not seen, we had the chance of seeing the painted storks. There are about 22 trees big and small located in the dry-non-irrigated fields along the road side and in court yards. These were exclusively occupied by painted storks numbering 800 to 1000, each tree had on an average about 16 nests with either one or two young. None had three young. Almost all the young were flying.

The place is undisturbed and the young move under the trees in perfect harmony with cats and dogs in search of dropped fish. The Brahminy kites were present usually in large numbers with their immature young, and were seen scanning below the trees.

An interesting feature was that as the local people were engaged in transporting the scraped guano in bullock-cart, the young birds moved around them as if tame and domesticated. But when we approached they took to flight and started soaring.

The following trees are used for nesting:

Ficus bengalensis 4, *Ficus religiosa* 2, *Tamarindus indicus* 11, *Acacia arabica* 3 and an Avenue tree with yellow flowers 2.

We were told by the villagers that of these trees, only three were used by grey pelicans, two being Banyan trees located in the fields and a tamarind located in the middle of village. All the trees are reasonably tall about 30-40' in height and it is very difficult to photograph a bird with 200 mm telephoto lens. We were told that about 12 grey pelicans still visit the village for roosting though majority of them left in the month of May.

The local people keep strict vigil on these birds, poachers and egg lifters are heavily fined. The bird excreta is rich manure and is scraped from the ground for use as manure in the fields. The landless however, sell the manure at Rs. 400/- per tree.

It was said that painted storks use tanks and irrigated fields as their foraging ground whereas pelicans exclusively feed in the tanks.

The whole Mandya District of Karnataka is well irrigated by tanks and rivers. Simsa a tributary of River Kaveri is barely half kilometre from the Pelicanry site, which again is a source of food for fish eating birds.

According to the local people about 100-150 pelicans breed in the village every year.

DISCUSSION

The spottedbilled or grey pelican (*Pelicanus philippensis* Gmelin 1789) frequents well watered tracts throughout the country and Pelicanries have existed in well watered tracts without increasing in numbers. It appears that the trees and water sources were same even before, no improvement has been made in the habitat of the areas. Probably this may be one of the reasons for maintaining the almost balanced number all through the years.

The southern states with their rich natural resources can provide a suitable habitat for such avifauna and attract increased numbers, especially where villagers themselves have recognised a mutualism and find that bird's presence helps in their rural economy.

As the birds are mostly fish dependent, its excreta contains high percentage of Phosphates and Nitrogen and is a very good substitute for chemical manures.

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